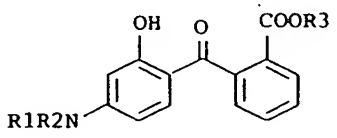
CLAIMS 53543

1. (original) A process for the preparation of 2-(4-N,N-dialkylamino-2-hydroxybenzoyl)benzoic esters of the formula I,



I

in which the substituents, independently of one another, have the following meanings:

R^1 and R^2

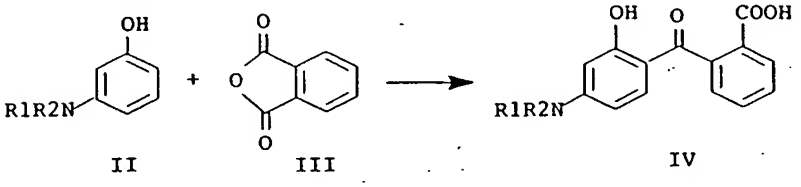
are C_1-C_6-alkyl, C_3-C_{10}-cycloalkyl selected from the group consisting of cyclopropyl, cyclobutyl, cyclopentyl, cyclohexyl, cycloheptyl, 1-methylcyclopropyl, 1-ethylcyclopropyl, 1-propylcyclopropyl, 1-butylcyclopropyl, 1-pentacyclopropyl, 1-methyl-1-butylcyclopropyl, 1,2-dimethylcyclypropyl, 1-methyl-2-ethylcyclopropyl, cyclooctyl, cyclooctyl and cyclodecyl;

R^3 is C_1-C_{12}-alkyl, C_3-C_{10}-cycloalkyl selected from the group consisting of cyclopropyl, cyclobutyl, cyclopentyl,

cyclohexyl, cycloheptyl, 1-methylcyclopropyl, 1-ethylcyclopropyl, 1-propylcyclopropyl, 1-butylcyclopropyl, 1-pentacyclopropyl, 1-methyl-1-butylcyclopropyl, 1,2-dimethylcyclypropyl, 1-methyl-2-ethylcyclopropyl, cyclooctyl, cyclooctyl and cyclodecyl

by

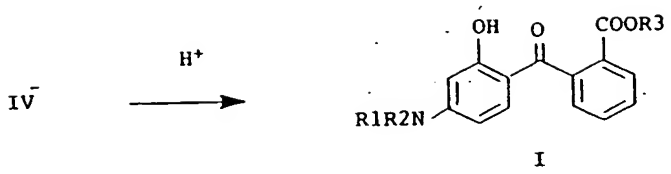
I. reaction of 3-N,N-dialkylaminophenol of the formula II, in which R^1 and R^2 have the meanings given above, with phthalic anhydride of the formula III to give 2-(4-N,N-dialkylamino-2-hydroxybenzoyl)benzoic acid of the formula IV and



II III IV

II. subsequent esterification of the 2-(4-N,N-dialkylamino-2-hydroxybenzoyl)benzoic acid of the formula IV formed in stage I with a C_1-C_{12}-alcohol or a cyclic C_3-C_{10}-alcohol in the presence of an acidic catalyst to give the 2-(4-N,N-dialkylamino-2-hydroxybenzoyl)benzoic ester of the formula I,

CLAIMS 53543



I

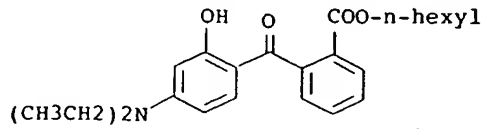
which comprises crystallizing the ester of the formula I formed and purifying the crystals in a further process stage III by treatment with an adsorbent and/or by distillation.

2. (original) A process as claimed in claim 1, wherein the adsorbent is a substance chosen from the group consisting of activated carbons, aluminum oxides, zeolites and silica gels.

3. (currently amended) A process as claimed in claim 1 ~~or 2~~, wherein the esterification in the process stage II is carried out in the presence of sulfuric acid as catalyst.

4. A process as claimed in any of claims 1 to 3, wherein the 2-(4-N,N-dialkylamino-2-hydroxybenzoyl)benzoic ester of the formula I formed comprises less than 10 ppm of rhodamine.

5. A process as claimed in any of claims 1 to 4, wherein the benzoic ester is n-hexyl 2-(4-N,N-diethylamino-2-hydroxybenzoyl)benzoate of the formula Ia



Ia

CLAIMS 53543

6. (currently amended) A process as claimed in claim 1 ~~any of claims 1 to 5~~, wherein, in the process stage III, the adsorbent used is activated carbon or silica gel.

7. (original) A process as claimed in claim 6, wherein, in process stage III, the ester is purified by treatment with activated carbon and subsequent distillation.

8. (original) A process as claimed in claim 7, wherein, in the process stage III

a. the ester is dissolved in a nonpolar solvent at a temperature in the range from 10°C to 100°C,

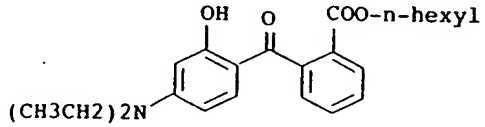
b. this solution is passed over a granular activated carbon bed at a temperature in the range from 20°C to 100°C,

c. the ester, after passing through the granular activated carbon bed, is separated off from the solvent by distillation.

9. (original) A process as claimed in claim 8, wherein the solvent used in the process step IIIa is cyclohexane or toluene.

CLAIMS 53543

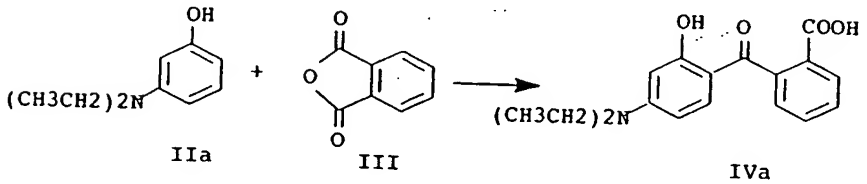
10. (original) A process for the preparation of n-hexylyl 2-(4-N,N-diethylamino-2-hydroxybenzoyl)benzoate of the formula Ia



Ia

by

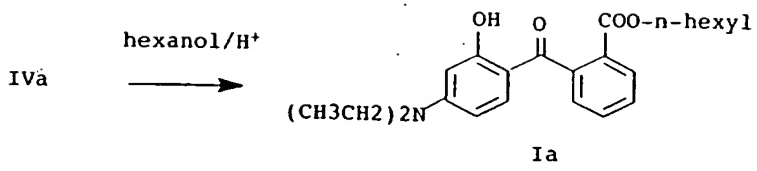
I. reaction of 3-N,N-diethylaminophenol of the formula IIa with phthalic anhydride of the formula III to give 2-(4-N,N-diethylamino-2-hydroxybenzoyl)benzoic acid of the formula IVa,



IIa III IVa

II. esterification of the 2-(4-N,N-diethylamino-2-hydroxybenzoyl)benzoic acid of the formula IVa formed in stage I in hexanol in the presence of sulfuric acid to give n-hexyl 2-(4-N,N-diethylamino-2-hydroxy]benzoyl)benzoate of the formula Ia

CLAIMS 53543



Ia

and isolation of the n-hexyl ester Ia in crystalline form,

III.

a. dissolution of the n-hexyl ester Ia in toluene or hexanol at a temperature in the range from 25°C to 50°C,

b. metering of this solution over a granular activated carbon bed or a silica gel bed at a temperature in the range from 25°C to 50°C and

c. subsequent isolation of the n-hexyl ester by separating off the toluene and/or hexanol by distillation.